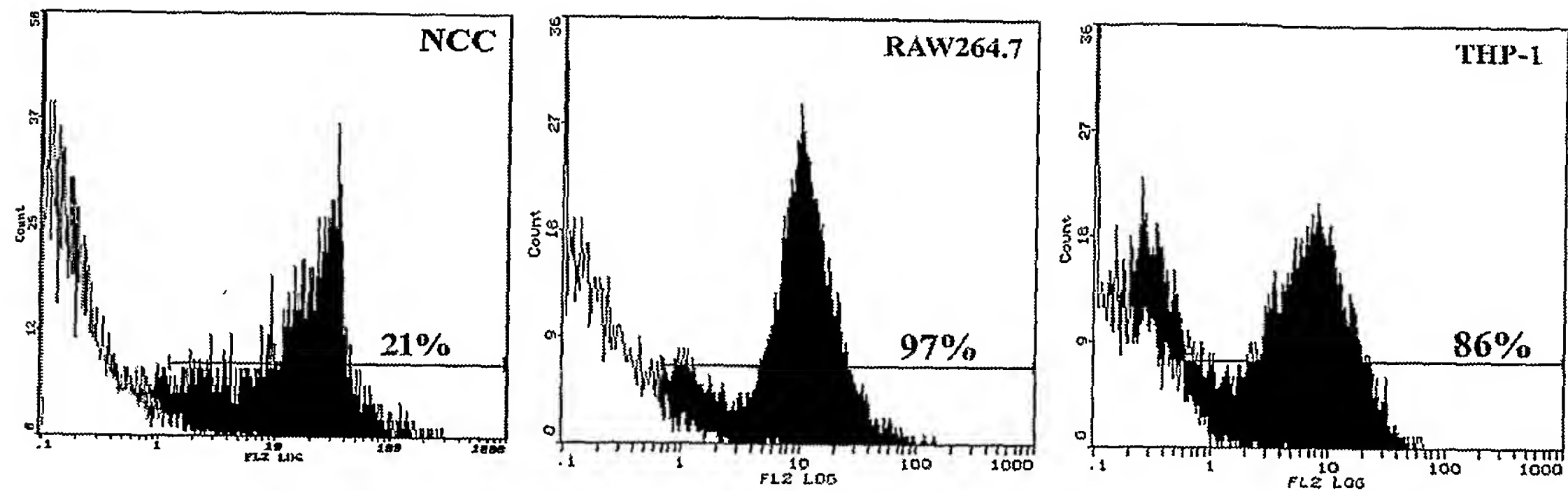


Figures 1A - 1B

A



B

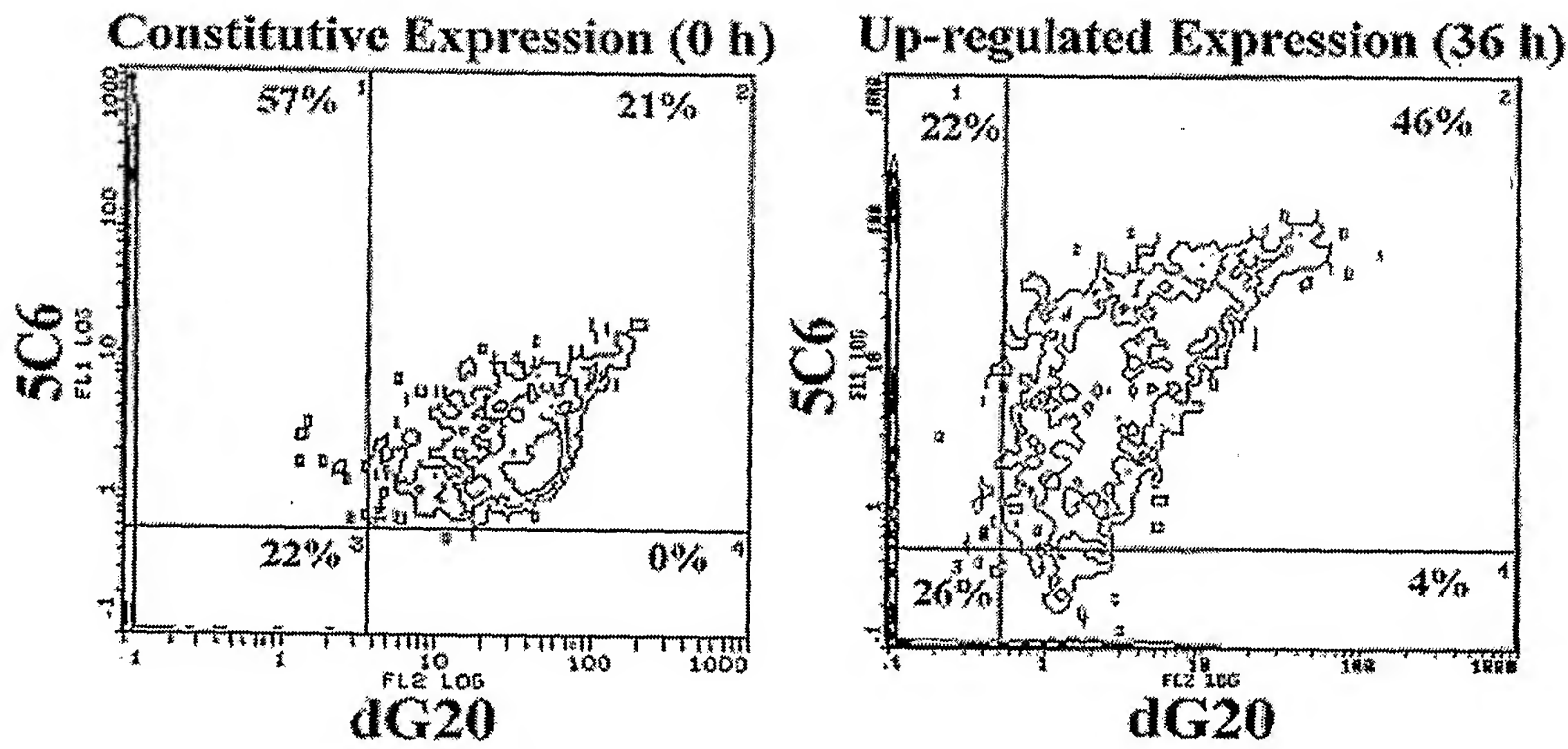
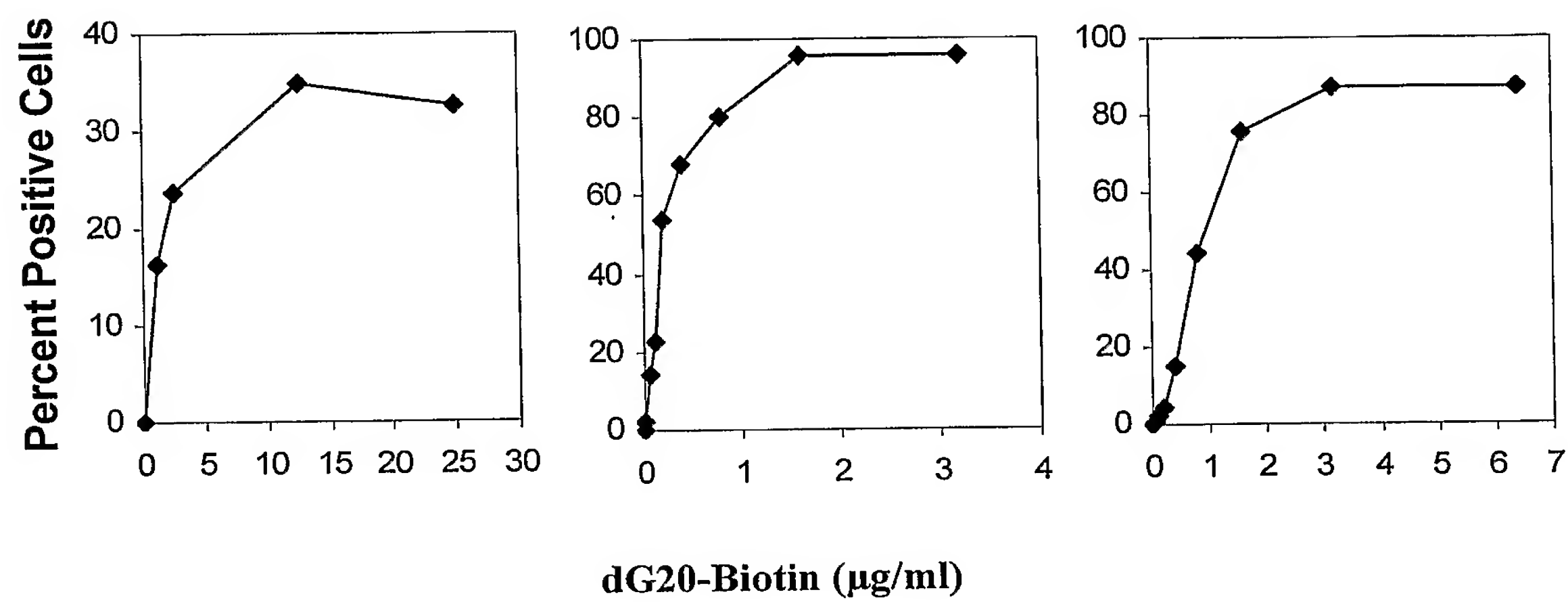
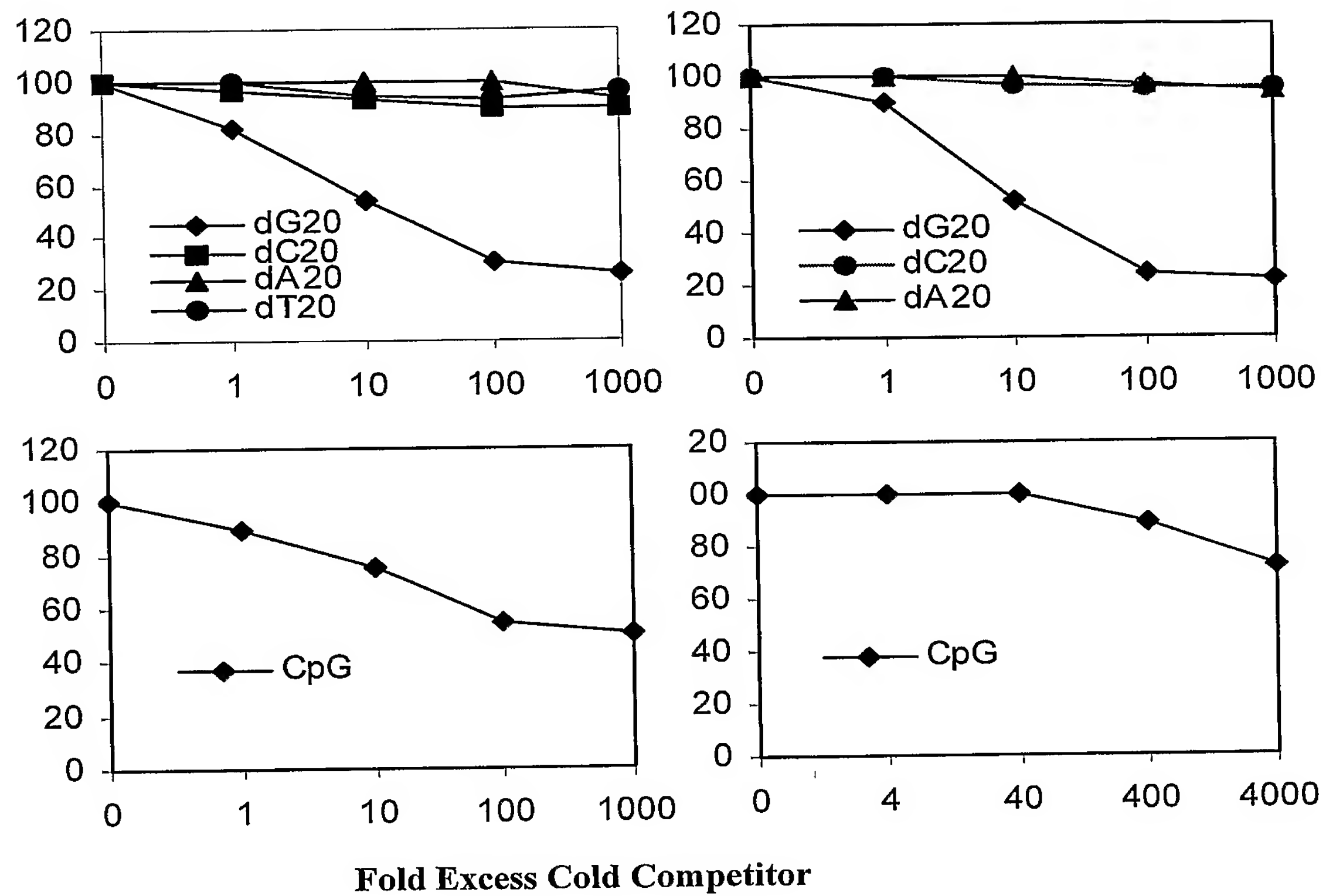


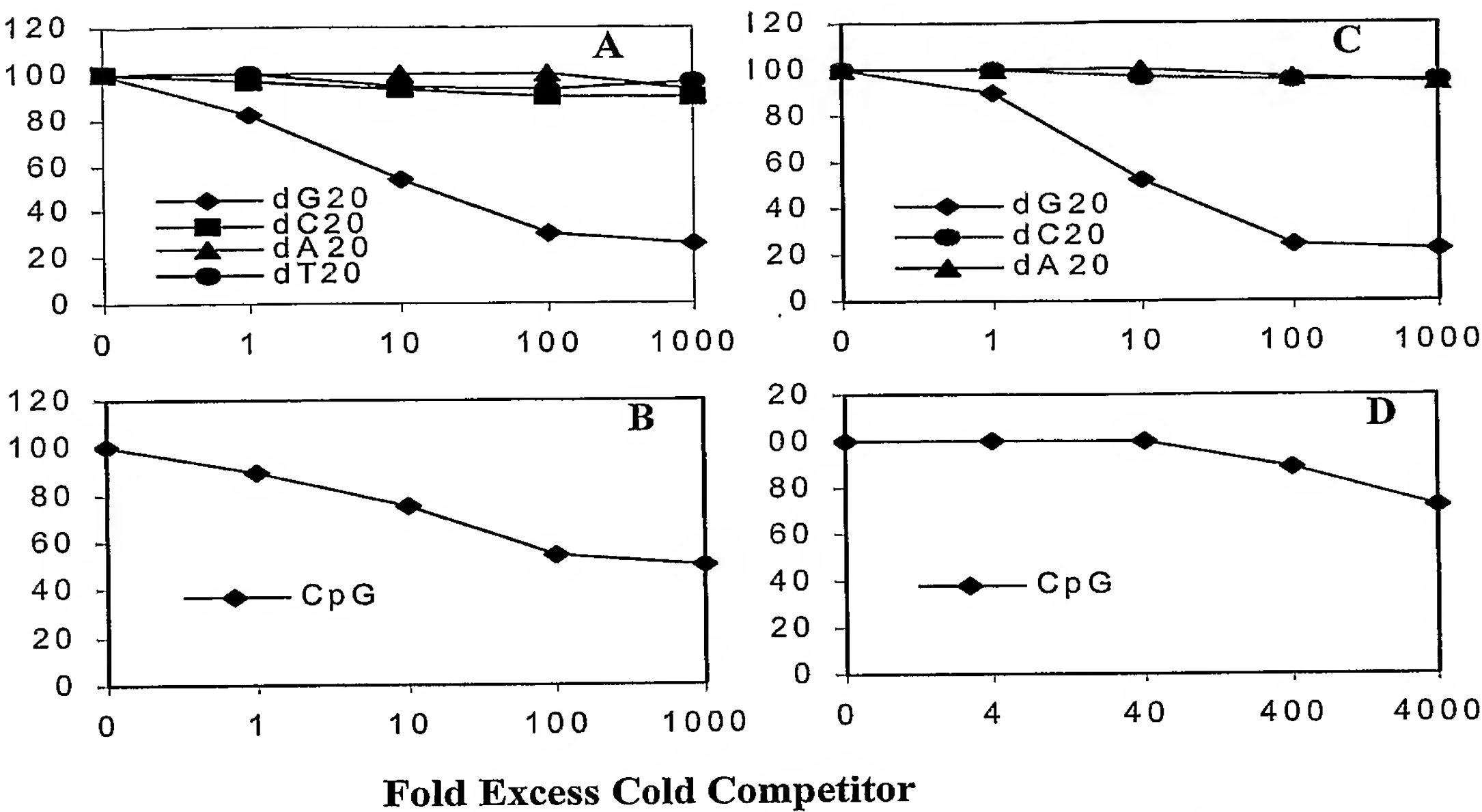
Figure 2



Figures 3A - 3D

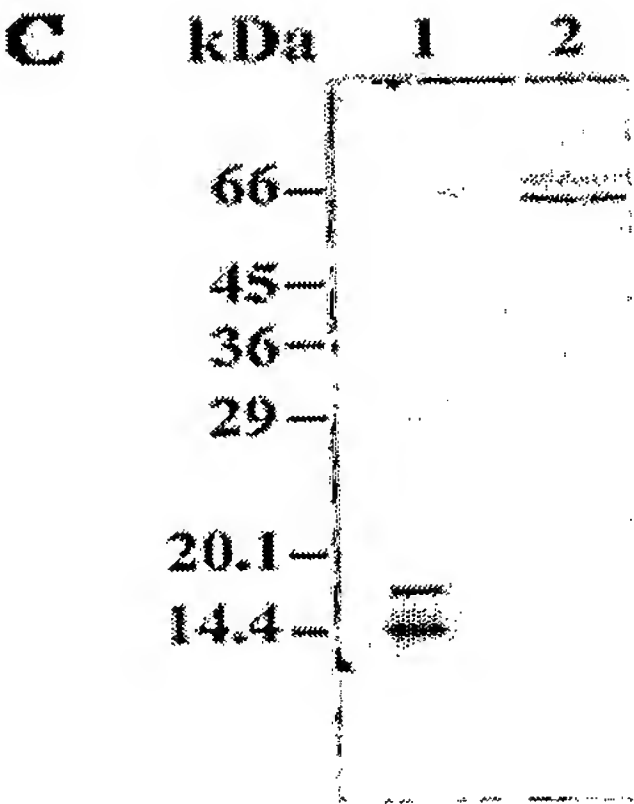
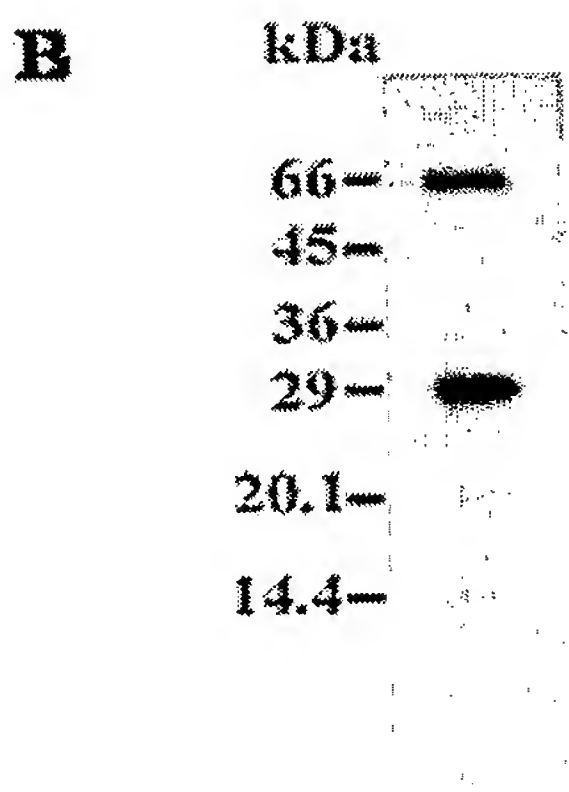


Figures 4A - 4C



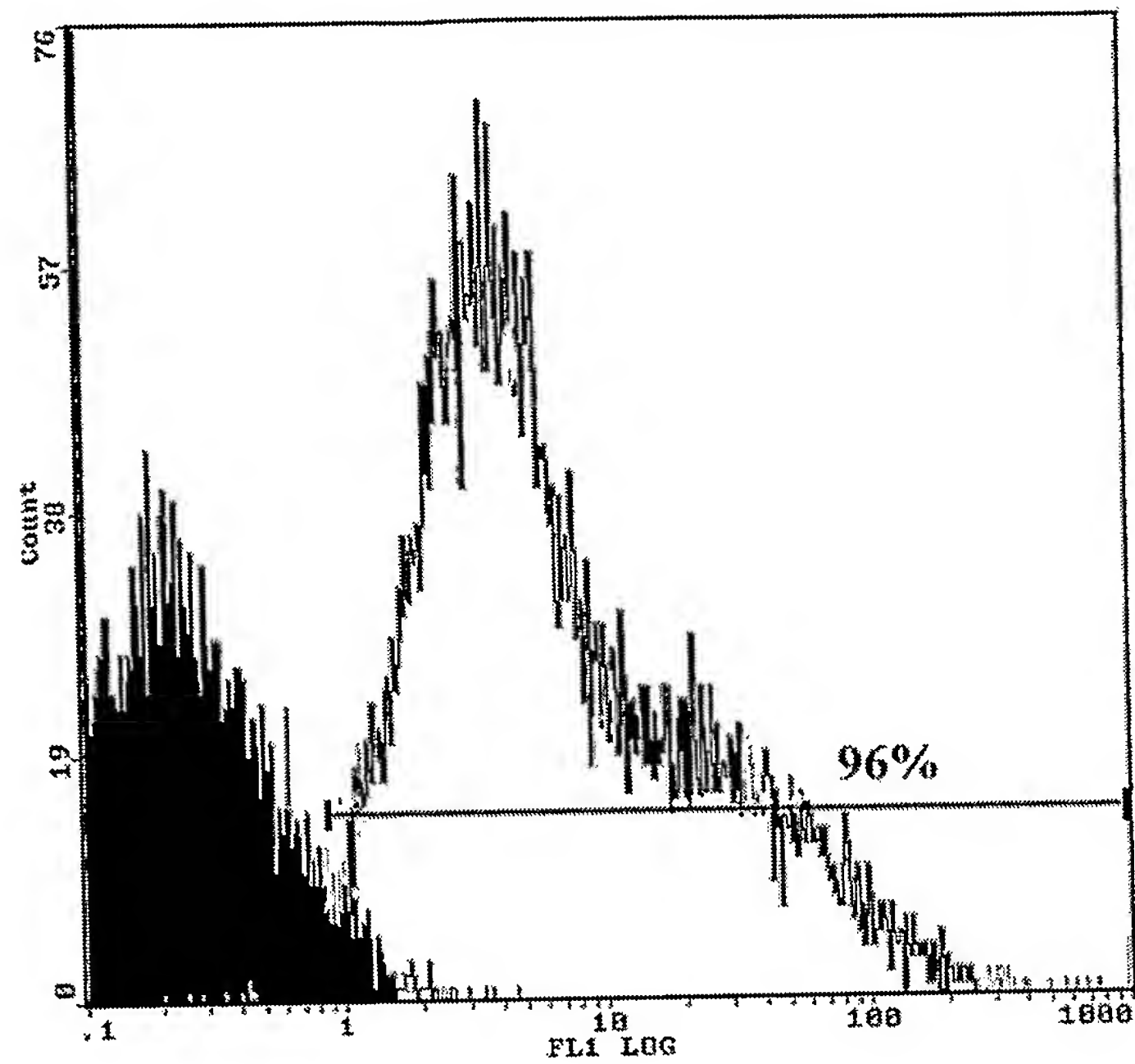
A 1 2 3 4 5 6

66—
45—
36—
29—
20.1—
14.2—



Figures 5A - 5B

A



B

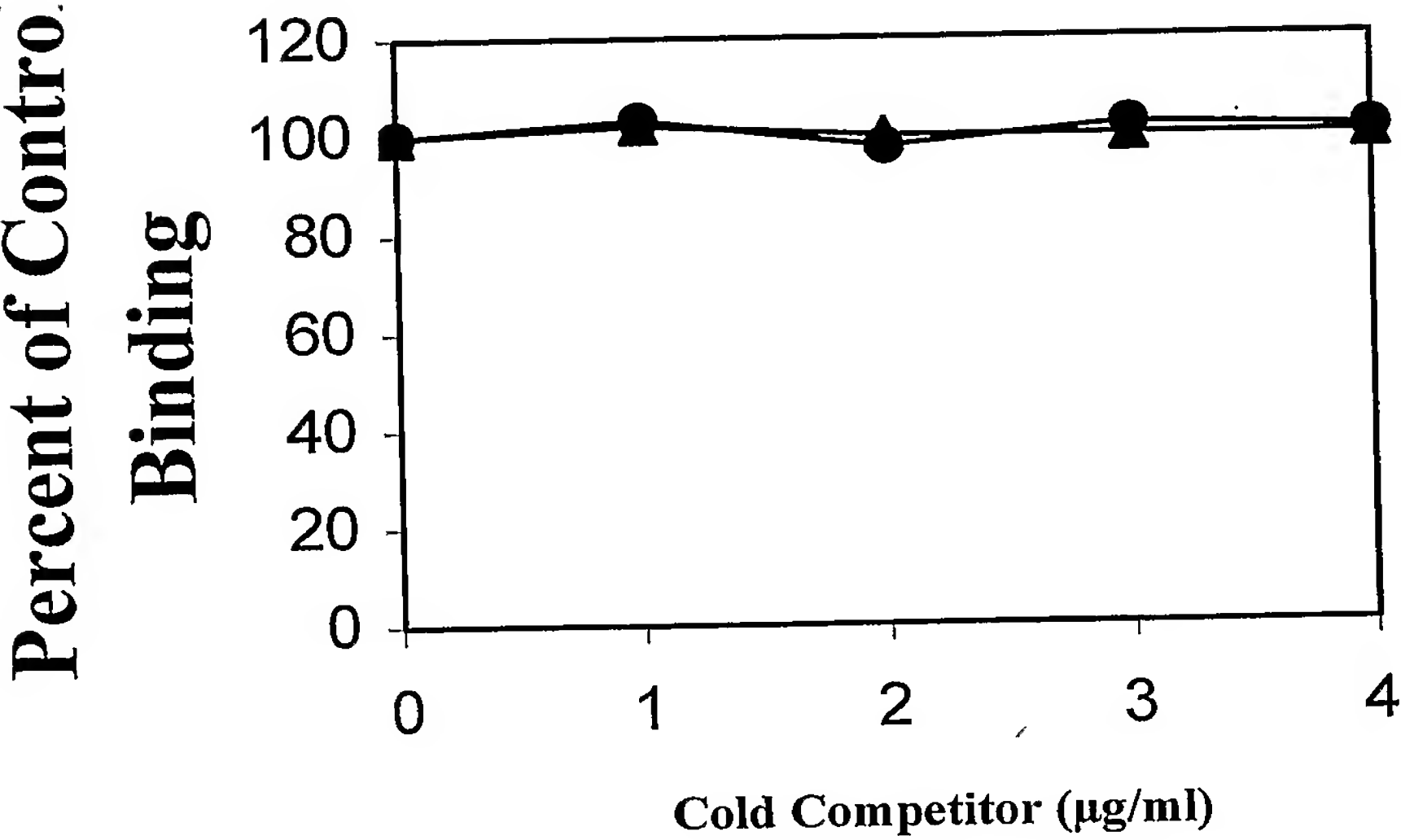


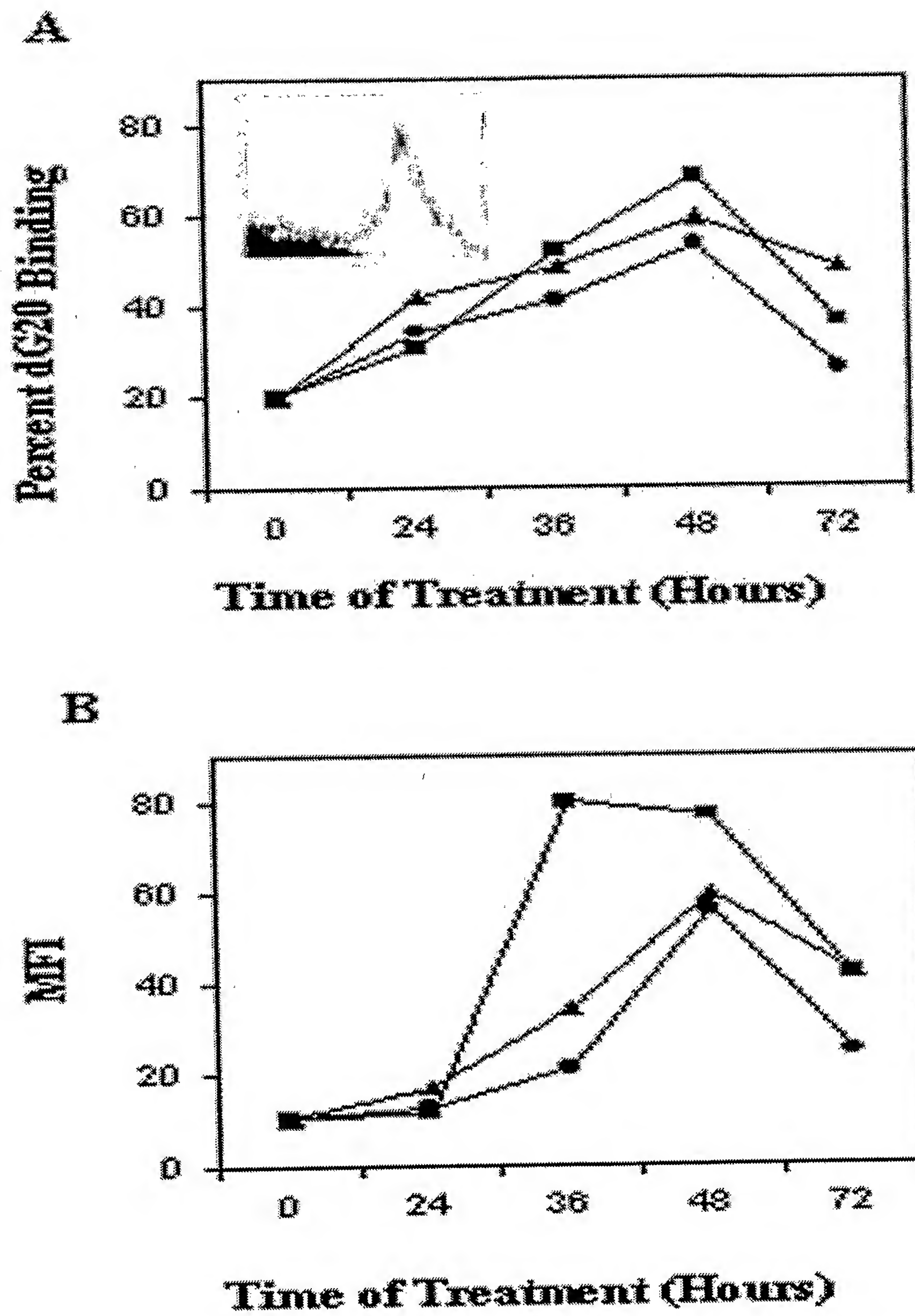
Figure 6

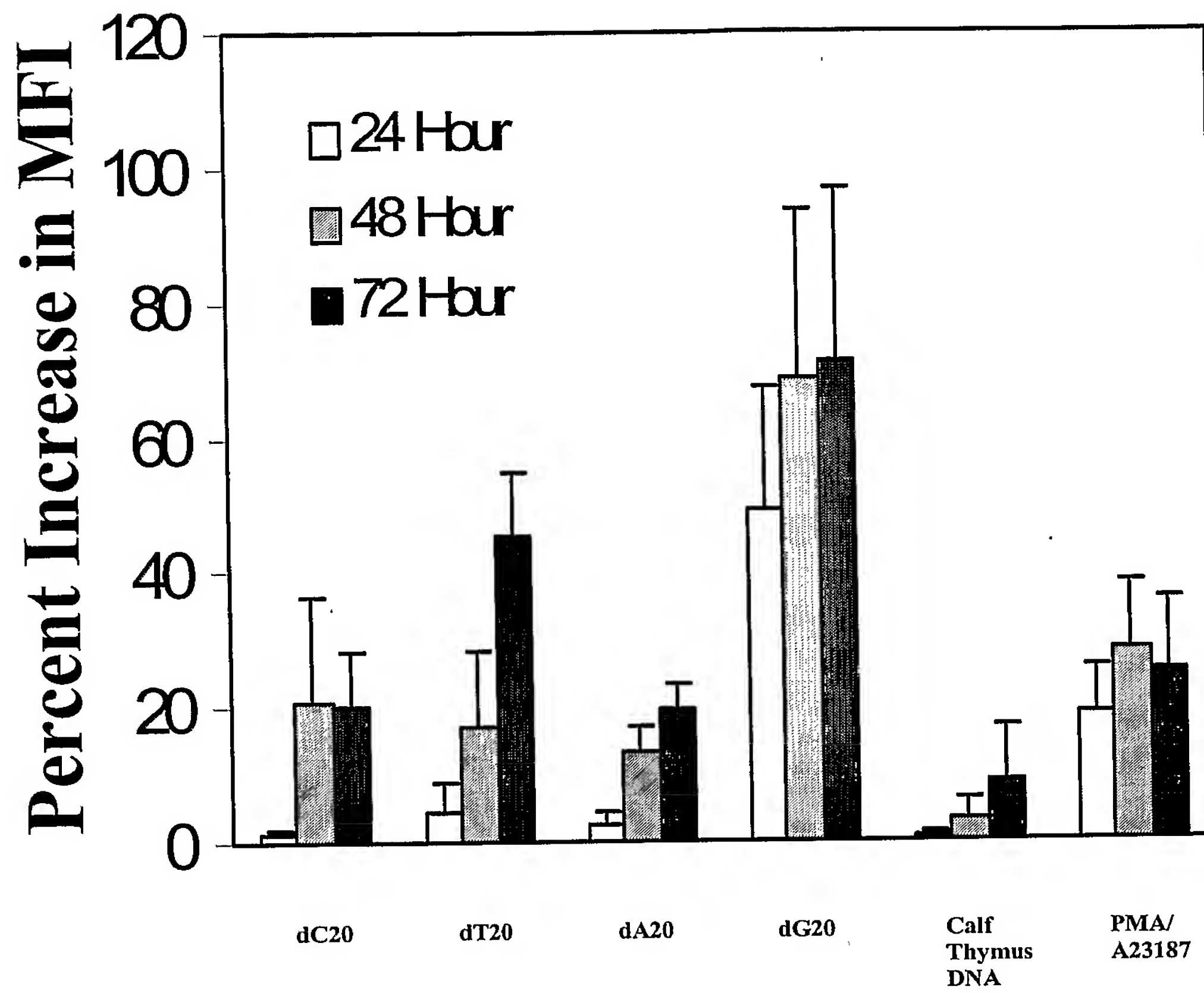
Figure 7

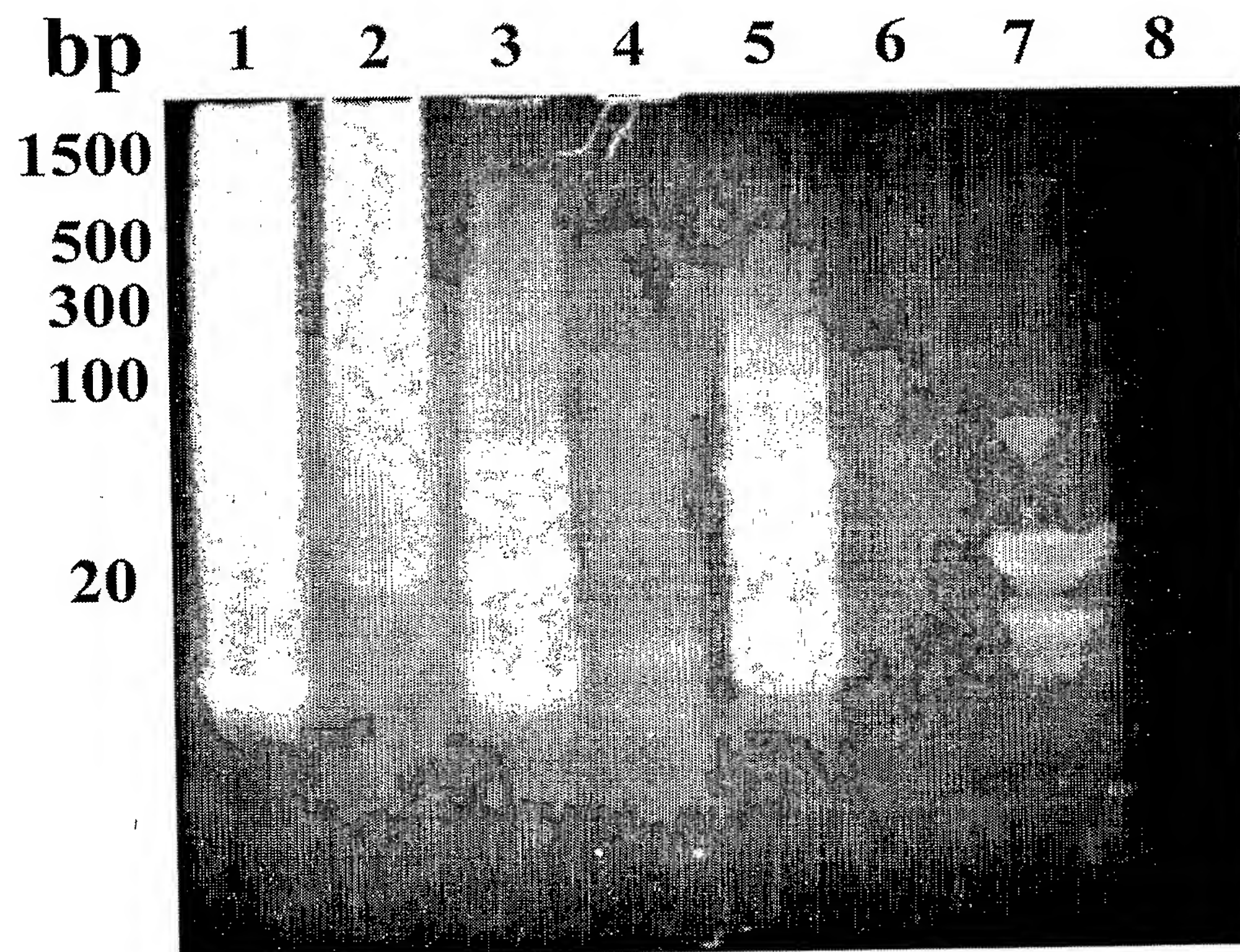
Figure 8

Figure 9

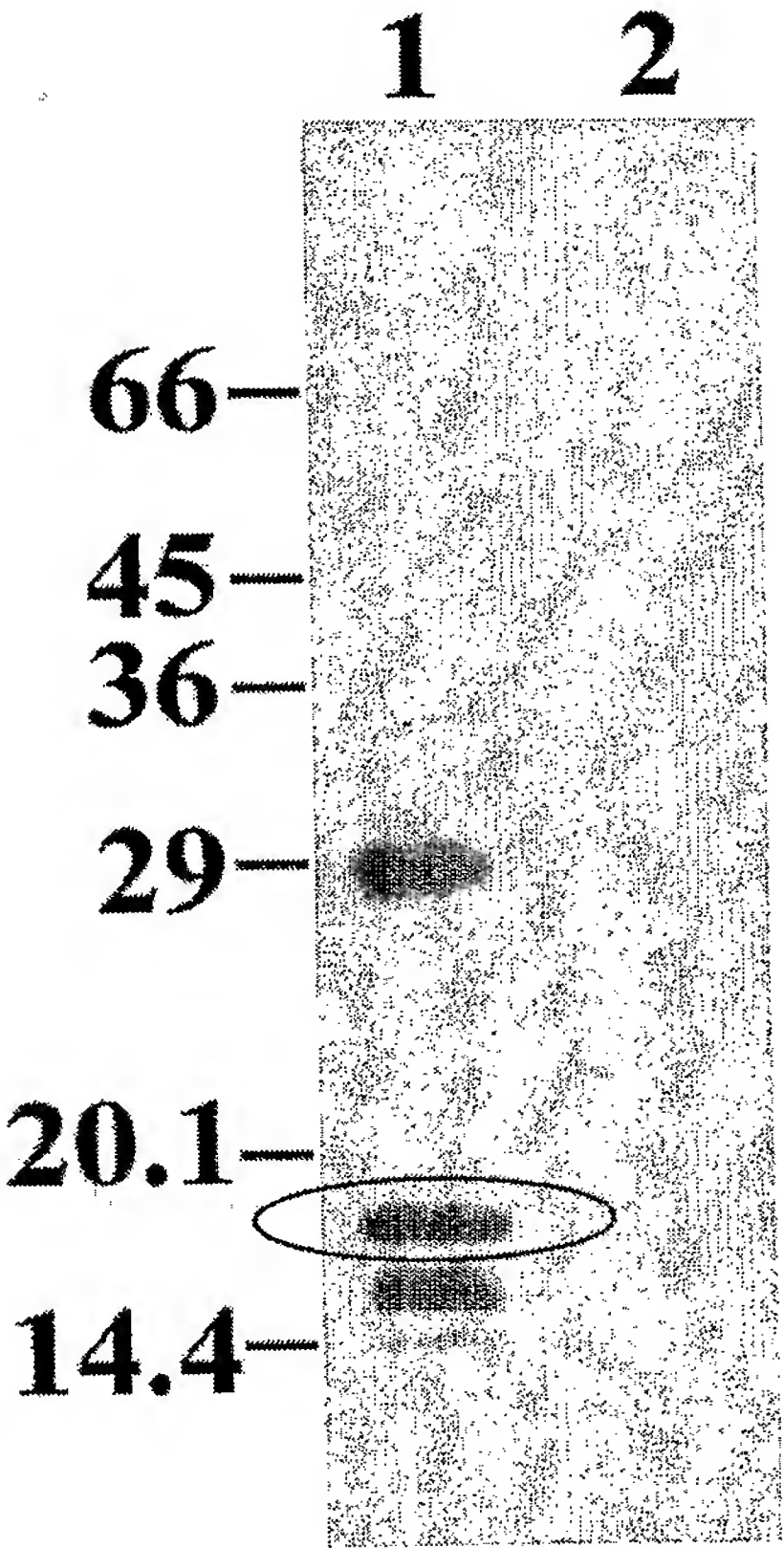


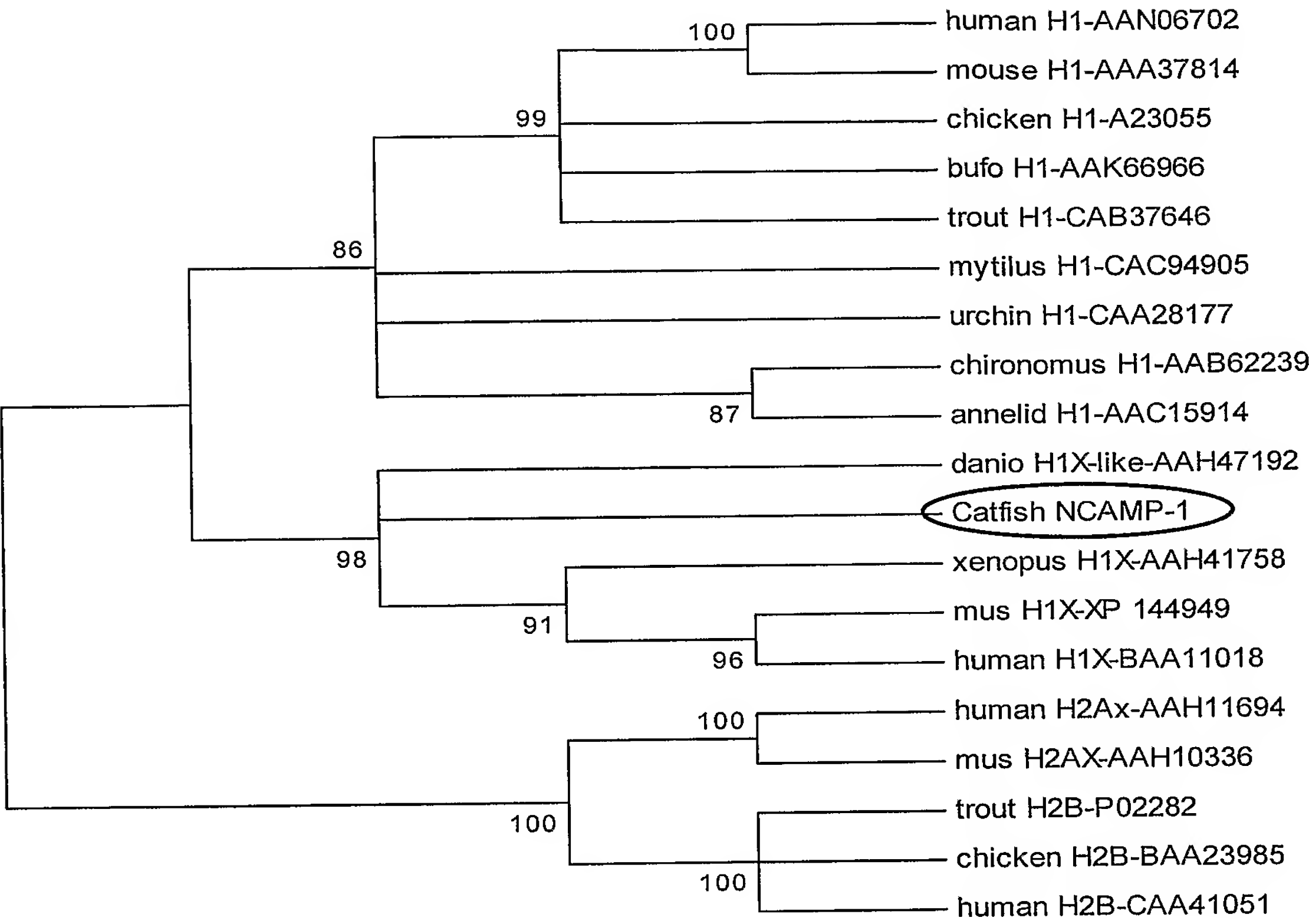
Figure 10

1	CGGCACGAGGGTTCAATAGCATCTCAAGGCGCTTCAGAACTTAAAGTTGA	
	M S A Q A E E T A P E A A A P V	16
51	ACCATGTCTGCTCAGGCTGAGGAACTGCACCAGAAGCAGCAGCACCAGT	
	Q P S Q P A A K K K G P A S K A	32
101	ACAACCATCACAACCAGCGGCCAAAAAGAAGGGACCCGCCAGTAAAGCAA	
	K P A S A E K K N K K K G K G P	49
151	AGCCTGCCTCTGCAGAAAAAAGAACAAAAAGAAGAAAGGGAAAGGGCCC	
	G K Y S Q L V I N A I Q T L G E R	66
201	GGAAAGTACAGCCAGCTGGTGATCAATGCTATCCAAACGCTGGGAGAGAG	
	N G S S L F K I Y N E A K K V N	82
251	AAACGGCTCGTCTCTTTTTAAGATCTACAACGAGGCGAAGAAAGTGAAC	
	W F D Q Q H G R V Y L R Y S I R A	99
301	GGTTTGACCAGCAGCACGGGCGCGTGACCTCCGCTACTCCATCCGCGCG	
	L L Q N D T L V Q V K G L G A N G	116
351	CTGCTGCAGAACGACACGCTCGTGCAGGTGAAGGGTCTGGGCGCCAACGG	
	S F K L N K K K F I P R T K K S	132
401	CTCCTTCAAGCTCAACAAAAAGAAGTTCATCCCCAGAACCAAGAAGAGCT	
	S V K P R K T A K P T K K P A K K	149
451	CTGTAAAGCCGAGAAAGACTGCGAAACCGACCAAAAAGCCAGCCAAAAAA	
	A A K K K K R V S G V K K A T P P	166
501	GCAGCGAAGAAGAAGAAAAGGGTCAGCGGCGTGAAGAAGGCGACTCCCCC	
	P E K T S K P K K A D K S P A V	182
551	CCCAGAGAAAACCTCCAAACCCAAGAAAGCGGATAAAAGTCCAGCCGTCT	
	S A K K A S K P K K A K Q T K K T	199
601	CTGCCAAGAAGGCGAGCAAGCCCAAGAAAGCTAAACAGACAAAAAAGACT	
	A K K T *	203
651	GCTAAGAAGACTTAAAACGTTTATATTCTGCATGCTTTGTGCATTAAGCA	
701	TTGCACTGCGGGTAAACTGCACGCTTTCTGATCGCAGTTCATTAAGTAGG	
751	ATATGCACAGTGTTTAACCAAGTGTGCAAGTCACTCTGGTCTCAATGTTT	
801	TACTGATGTAACCACATGTAAATAACTGTACAAAGAAGGAAACAATCACT	
851	TTTGTAACGTCTGCTTTGTTATTATTTCTTTTCTACTAGTTAGCTAAAAT	
901	AACTGCTTATGGCTTCTTTTAAATAAAATGATAAAAGAAAAA	
951	<u>AAAAAA</u>	

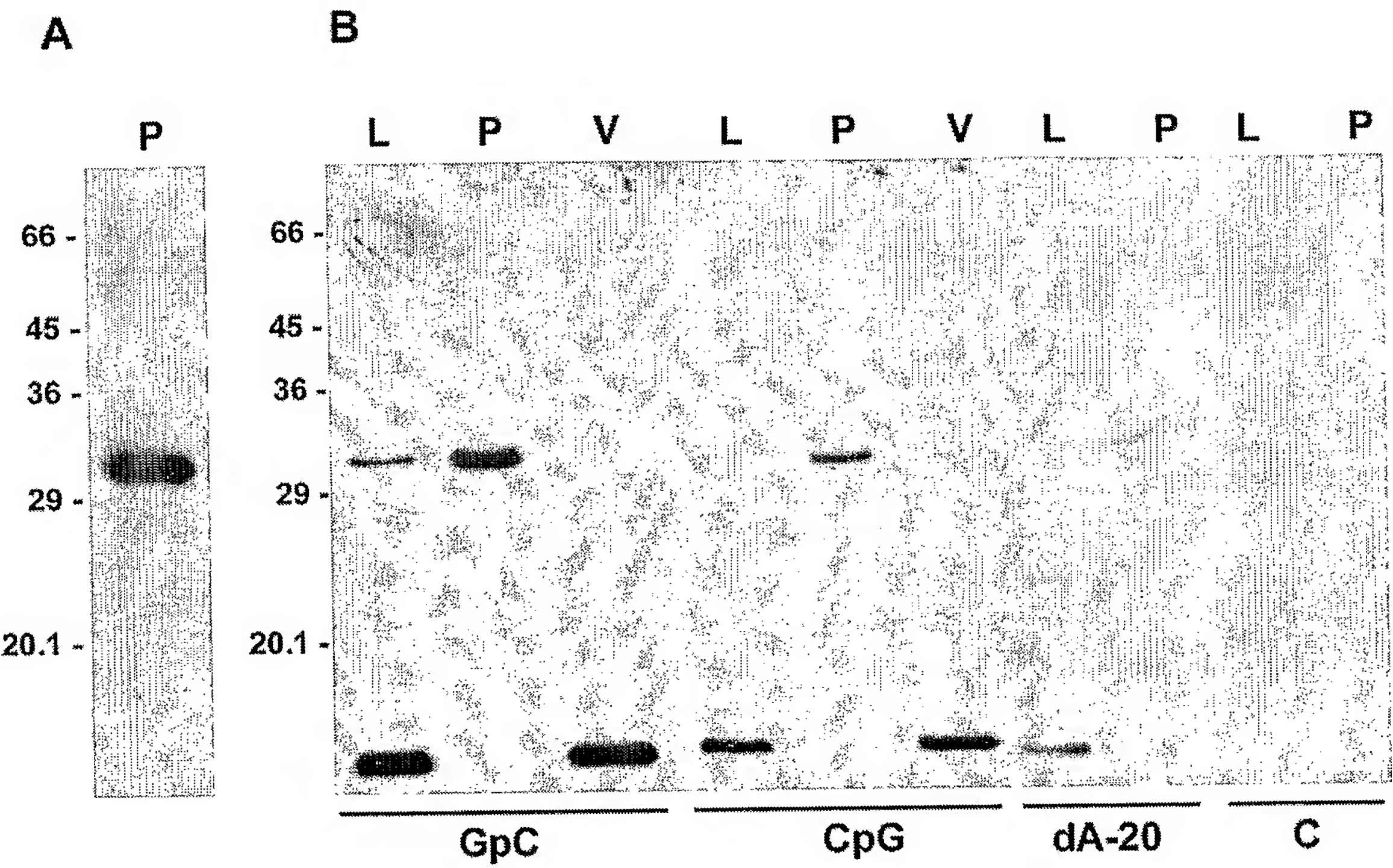
Figure 11

Catfish NCAMP-1	: MSAQAEETAP	EAAPVQPSQP	-----AAKKGPAS	KAPASAEKKNNKKKGK	PGKYSQ	LVINAI	IQTLGERNG	: 66							
Danio H1X-like-AAH47192	: -----MPAVVE	ESAPAPAPAP	-----AEKKAKPAVA	ASPAKK	-----KKKSKSG	PGKYSQ	LVTD	IRTTLGERNG	: 59						
Xenopus H1X-AAH41758	: -----MALELE	ENLHSTEE	DEEEDE	EEEGDEM	RSRSTRNKGGA	SSSGNKKKK	--KKNQ	PGRYSQ	LVVD	IRKLGERNG	: 73				
Mus H1X XP_144949	: -----MSVELE	EEALPPTS	ADG	-----TARKTAKAGG	SAAPTQPKRRKN	-RKKNQ	PGKYSQ	LVVET	IRKLGERGG	: 63					
human H1X-BAA11018	: -----MSVELE	EEALPVT	TAEG	-----MAKKVT	KAGGSAALSPSKRRKNSKK	KNQ	PGKYSQ	LVVET	IRRLGERNG	: 64					
Catfish NCAMP-1	: SSLEFKIYNE	EAKKVN	WFDQ	QHGRVYLR	YSIRALLQ	NDTLVQ	VKG	LGANGSFK	LNKKKK	FIPRT	KKSSVVKPRKTA	KPTKKPAK	: 148		
Danio H1X-like-AAH47192	: SSLEFKIYNE	EAKKVS	WFDQ	KNGRMYLP	ASIRALV	NDTLVQ	VKG	FGANGSFK	LNKKKK	LEKKPKK	-AASKKA	TAKKTEKPTSK	: 138		
Xenopus H1X-AAH41758	: SSLAKIYSE	EAKKVS	WFDQ	QNCR	TYLKYSIKALV	QNDTLLQ	VKG	VGANGSFR	LNKKKK	LEGLPYD	KKPPPAK	PPSSSSSNKK	: 153		
Mus H1X XP_144949	: SSLARIYA	EARKVA	WFDQ	QNCR	TYLKYSIRALV	QNDTLLQ	VKG	FGANGSFK	LNRRKK	LEGGAERR	-GASAA	SSPAPKAR	--	: 140	
human H1X-BAA11018	: SSLEFKIYTE	EAKKV	WFDQ	QNCR	TYLKYSIKALV	QNDTLLQ	VKG	FGANGSFK	LNRRKK	LEGGERRG	APAAAA	TAPATAHKA	: 144		
Catfish NCAMP-1	: KAAK	-----KKKRVSGV	KKATPP	PEKTS	SKPK	-----KADKSP	AVSA	KKAS	KPKKAKQ	TAKTKAKKT	-	: 203			
Danio H1X-like-AAH47192	: KAVT	-----KKVS	AKKSAK	SPVKK	TKTKT	-----SVKKAT	AKPK	KTAS	KKPKAA	AKKTKSK	--	: 192			
Xenopus H1X-AAH41758	: QQQ	-----GPSSSP	SKSHK	AKPKA	KAEK	EKP	KTSSAK	AKSPK	KSAAKG	-KMKKK	AK	PSVRKAP	KS	KKA	: 217
Mus H1X XP_144949	: -----TAA	ADRTPA	RPO	-PERR	AHKS	-----KKA	AA	ASAK	KVKKAK	PSVPK	VPKGRK	-	: 188		
human H1X-BAA11018	: KKAAPGA	AGSRR	ADKKPA	RQKPEQ	RSHK	KGAGAK	KDKG	KAKK	TAAGG	KVKKAK	PSVPK	VPKGRK	-	: 213	

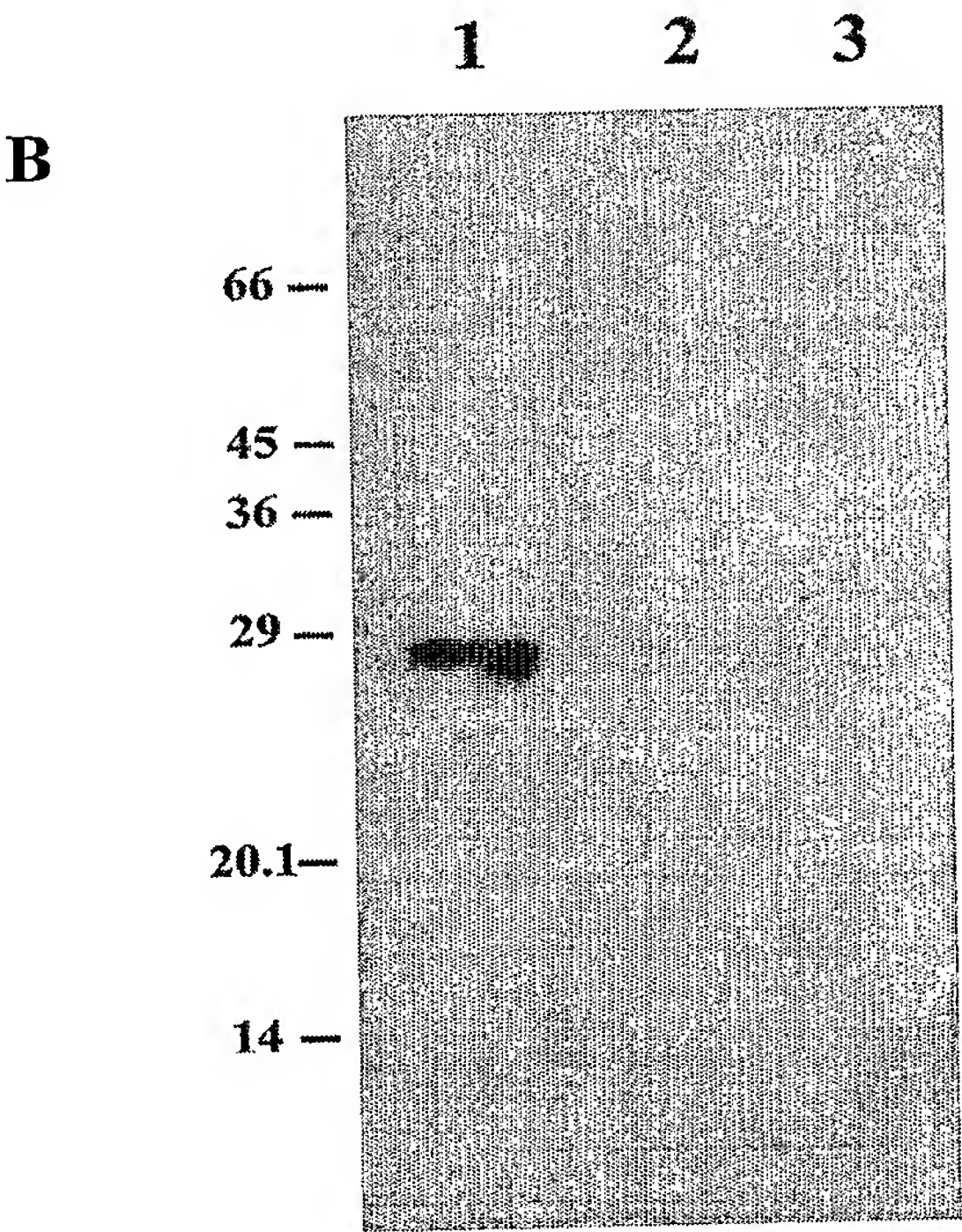
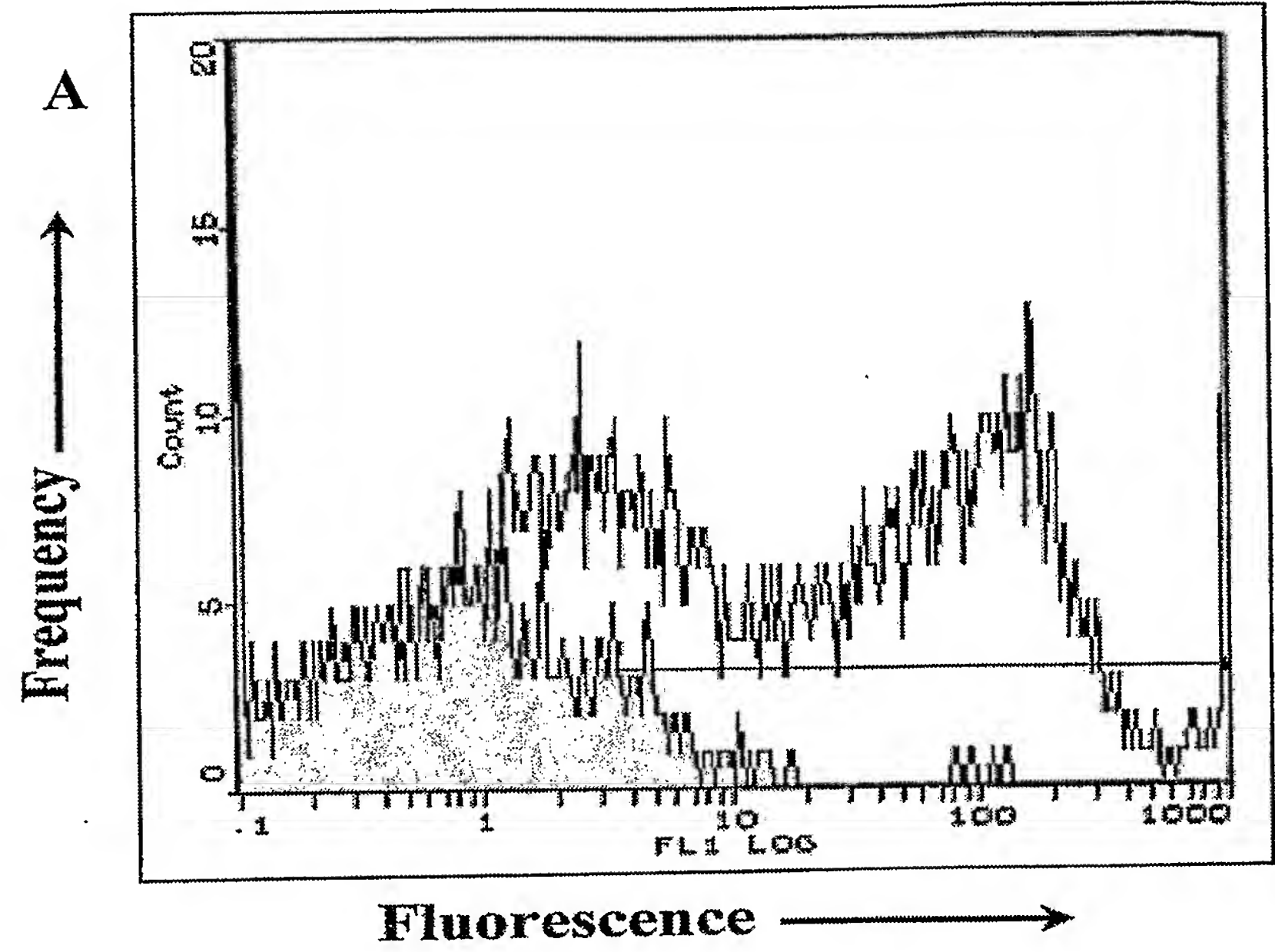
Figure 12



Figures 13A - 13B



Figures 14A - 14B



Figures 15A - 15B

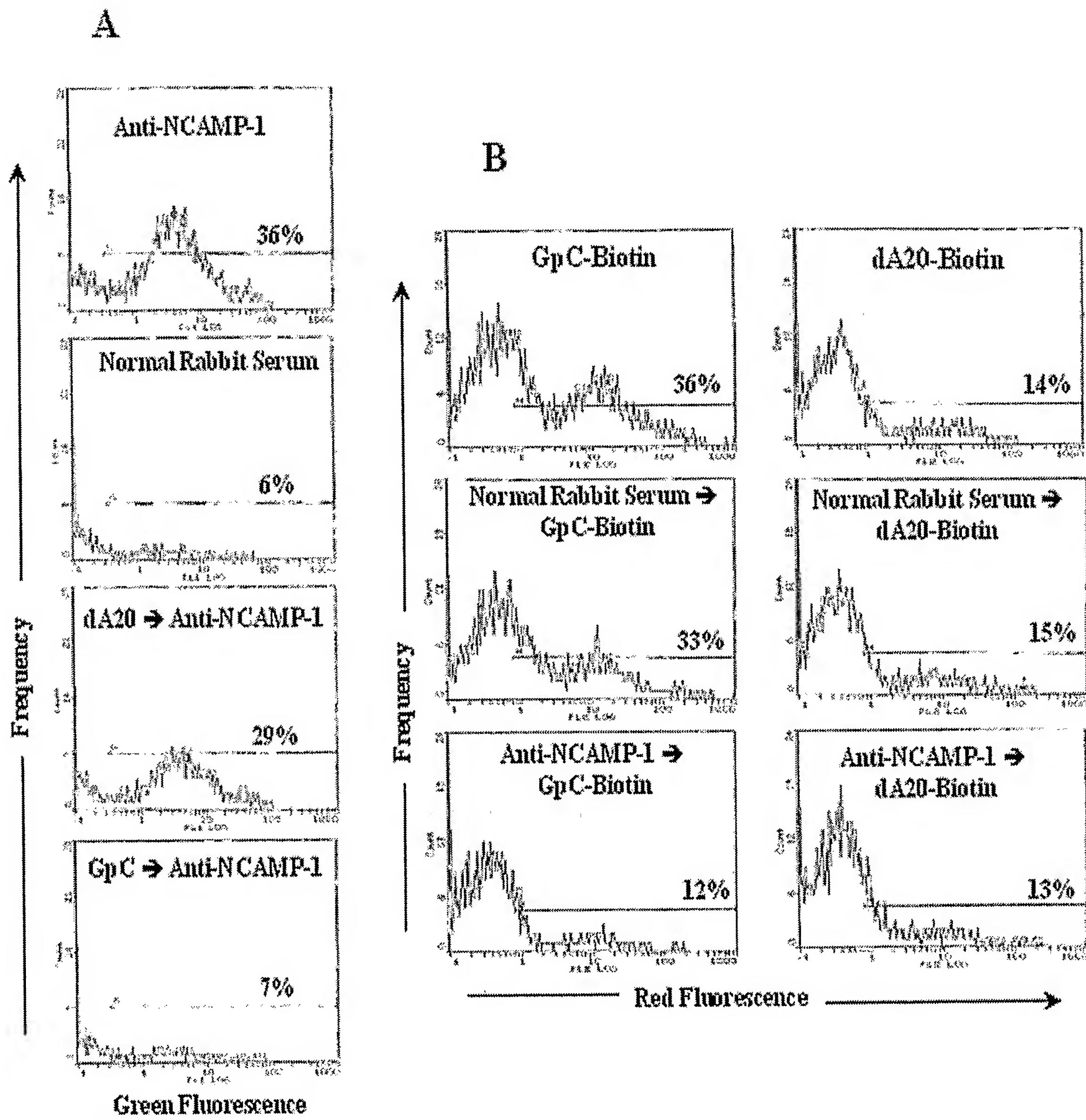


FIGURE 16

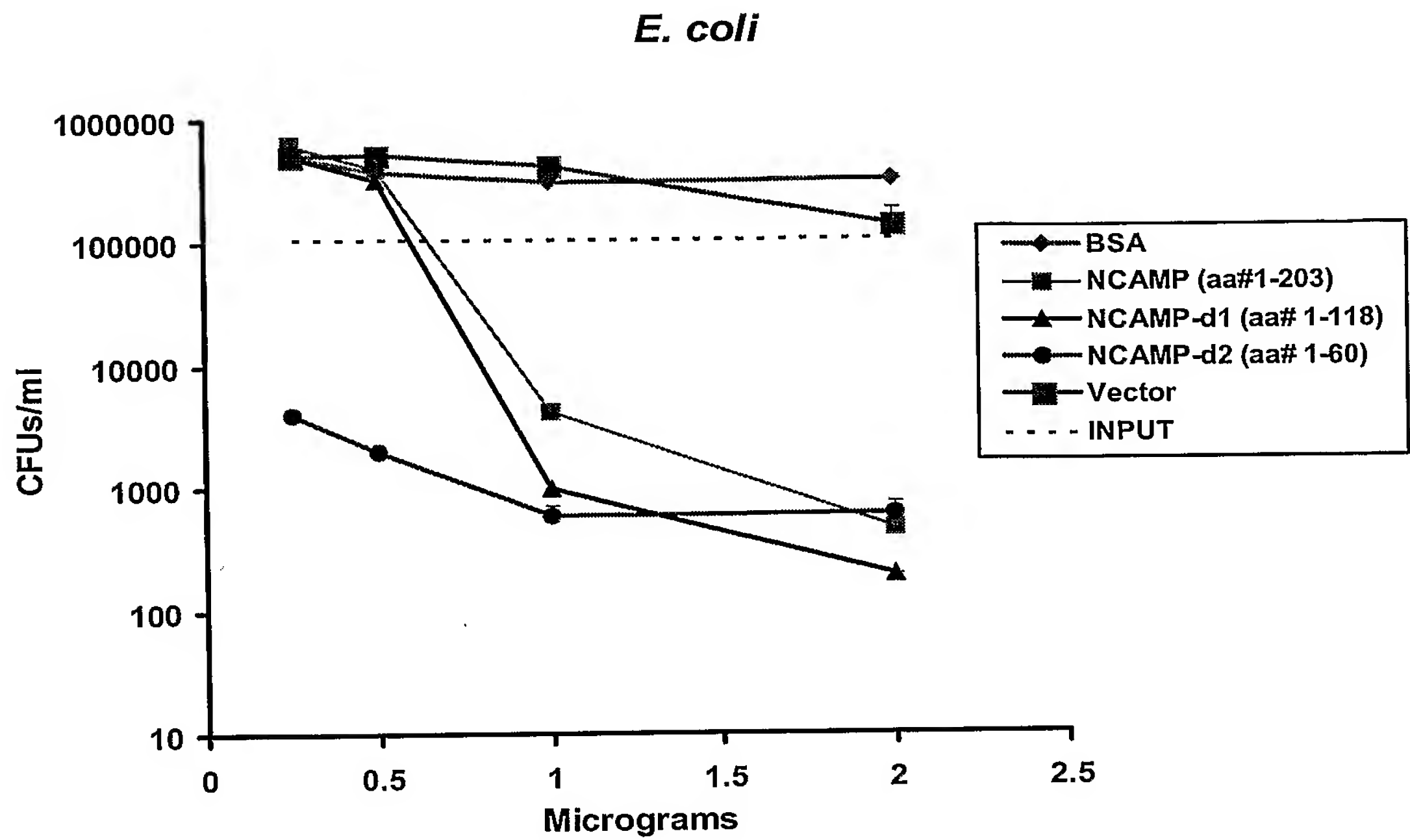
NCAMP-1 PEAAAPVQPSQPAAKKKGPASKAKPASAEKKNKKAKGKGPG
H1-Mus -----SETAPAEKPAPAKAE-
H1-Human ---KLNKKAAASGEAKPKAKAKSPKKAKA--
H1-Trout -KAVAAKKSPKKAKKPAT--

C-Terminal residues :

NCAMP-1
-TAKPTKKPAKKAACKKKRVSGVKKATPPPEKTSKPKKADKSPAVSAKKASKPKKAKQT
H2A CF --KGRGKQGGKVRAKAKTRSS--
H2B Trout -----PDPAKTAPKKGSKKAVTKXA--
H2B Bass1 -----PEPAKSAPKKGSKKAVT-
H2B Bass2 -----PDPAKPTAPKKGSKKAVTKTAG
H1-Trout -----AEVAPAPAAAAPAKAPKKKA
H1-Trout ---AEVAPAPAAAAPAKAPKKKAAAKPKK-----

Figures 17A - 17B

A



B

